

Guests present were: Miss D. BURGESS, A. C. ELEY, Mrs I. McCULLOCH, Dr AMICIA MELLAND, Mrs M. H. SETON-WATSON and T. A. H. SLACK.

Mr P. J. Conder spoke on Some Wetlands in Sind. He described areas which he had studied whilst preparing management plans for the World Wildlife Fund and gave details of the vast numbers of wildfowl and other birds present. He also explained the difficulties encountered in the conservation of birds there. His talk was illustrated with excellent slides.

A new race of the Spotted Ground Thrush *Turdus fischeri* from South Sudan

by G. Nikolaus

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During my 3-year study of the Imatong Mountains in South Sudan, I collected in the Lotti Forest (4° 03' N, 32° 32' E), on the southwestern slopes of the mountains, a single specimen of *Turdus fischeri*. I propose to name it:—

Turdus fisheri maxis subsp. nov.

Diagnosis: Differs generally from all other named races, and from a specimen from Upemba, southern Zaire, in its much darker and browner upperparts, and in being shorter winged (see Table 1). Further differences are: primary and secondary coverts blackish brown, contrasting with mantle; primary covert feathers each only with a small buff spot, instead of a broad light band in all other specimens examined; spotting of breast and flanks more heavily pronounced, the individual spots larger, almost jet black, only a little unspotted white on centre of belly; first (outer) primary in relation to total wing-length longer (details in Table 1) and broader.

Distribution: So far only known from the type locality, the Lotti Forest, where this one bird was caught on the first of 3 days mist-netting in virgin tropical lowland forest. This subspecies is isolated by 1200 km from *T. f. fischeri* on the Kenya coast, 2200 km from *T. f. belcheri* in southern Malawi, 1600 km from the unnamed Zaire form, and 3500 km from *T. f. natalicus* in South Africa.

Type: Subadult female (age about 6 months, head, tail and wing coverts still partly in immature plumage, collected in the Lotti Forest, Imatong Mts, South Sudan, at an elevation of 1250 m, 11 October 1979; in Naturkundemuseum Stuttgart, no. 58038.

Measurements and weight of type: Wing 108 (live bird, 110), tail 88, tarsus 34, culmen from base 24 mm, weight 62 g.

Further material examined:

T. f. fischeri: Sokoke Forest, Kenya. ad. ♀, 23.4.70; 2 ad. ♂♂, 2 ad. ♀♀, May 1966.

T. f. belcheri: Thyolo (Cholo) Mt., Malawi. ad. ♀, 21.9.51.

T. f. subsp.: Upemba, Zaire. ad. ♀, 7.10.73.

T. f. natalicus: Cape Prov., South Africa. 2 ad. ♂♂, 8 ad. unsexed.

All in British Museum (Natural History), Tring, except for the Zaire specimen, in Koninklijk Museum voor Midden-Afrika, Tervuren, and 3 *T. f. fischeri* in the National Museum of Kenya, Nairobi.

Remarks: The Imatong bird is named after our son Max.

Turdus fischeri is a rare bird of forests in eastern and southern Africa. The

Table 1
Measurements (mm) to show variations in wing-length and wing-formula in *Turdus fischeri*.

| Wing (W) | Primary measurements (P) | | | | | | | | $X = \frac{P \times 100}{W}$ | | | |
|------------------|--------------------------|---------|---------|---------|---------|-------------|-------------|-------------|------------------------------|-------------|--|--|
| | 1p† | 1p/2p* | 2p† | 1p/4p* | 4p† | 1p | 1p/2p | 2p | 1p/4p | 4p | | |
| <i>maxis</i> | 30 | 40 | 70 | 48 | 78 | 27.8 | 37.0 | 64.8 | 44.4 | 72.2 | | |
| Zaire subsp. | 28 | 47 | 75 | 57 | 85 | 25.0 | 42.0 | 67.0 | 50.9 | 75.9 | | |
| <i>belcheri</i> | 26 | 54 | 80 | 66 | 92 | 21.6 | 45.0 | 66.7 | 55.0 | 76.7 | | |
| <i>natalicus</i> | 25.5 | 53.7 | 79.2 | 65.1 | 90.6 | 21.5 | 45.0 | 66.3 | 54.5 | 75.9 | | |
| (n = 10) | (20-29) | (50-56) | (76-83) | (61-69) | (88-95) | (17.5-23.2) | (42.7-48.3) | (64.5-68.6) | (52.0-59.0) | (74.2-77.2) | | |
| <i>fischeri</i> | 23.8 | 55.0 | 78.8 | 64.0 | 87.8 | 21.1 | 48.9 | 70.0 | 56.9 | 78.0 | | |
| (n = 4) | (23-24) | (51-58) | (75-82) | (60-67) | (84-91) | (20.4-22.2) | (47.2-50.0) | (69.4-70.7) | (55.6-57.8) | (77.8-78.4) | | |

† = all these measurements are from the base of the first (outermost) primary to the tip of primary 1, 2 and 4 (wing tip).

* = difference from tip of first primary to tip of primary 2 or 4.

2 coastal races are known to be migratory, but the inland populations seem to be more sedentary, although it is very likely that the Imatong birds have local seasonal vertical movements. Benson & Benson (1975) suggest that *belcheri* is "probably resident", but Benson (pers. comm.) points out that they only knew of records for September and November (egg-laying in November). There is now also a record for 31 August (Douglas 1978). Benson feels that the situation in Malawi needs further investigation, especially as the figures in Table 1 for *belcheri* are similar to those for the migratory *natalicus* (see further below); but *belcheri* may at least show local vertical movements. From the age of the specimen of *maxis*, I would expect breeding at the start of the rains, in April, which is the opposite time of year to Malawi, south of the Equator, where the rains start in October or November.

The measurements in Table 1 indicate variations in the overall wing-length and (no less importantly) in the wing-formula of the species, even although unfortunately the only populations represented by more than one specimen are the coastal *natalicus* and nominate *fischeri*. That these 2 coastal populations are migratory is probably due to seasonal changes in habitat. Both show a tendency to long, pointed wings, most pronounced in *fischeri*, whose breeding grounds are still unknown. The wings of the evidently more strictly sedentary inland populations tend to be shorter and rounder, with an extreme in *maxis* of the Imatongs. According to the data in Table 1, it appears appropriate that the Zaire specimen is treated separately from *belcheri*, since all the figures for *belcheri* differ considerably, falling, indeed, within the ranges for the 10 specimens of *natalicus*. Thus the inland *belcheri* is exceptional in its wing measurements, and its separation from the breeding grounds of *natalicus* may have been a relatively recent event.

Based not only on the figures in Table 1 but also on the colour-characters described, it seems justifiable to recognise this new race, even though it is only known from a single sub-adult specimen. If immediate steps are not taken to preserve the Imatong forests, *maxis* could become extinct before more is learned about it.

POSTSCRIPT:

Benson would like to add to his personal communication above re *T. f. belcheri*: 'apart from Douglas's record for 31 August, which is from Soche Mt, one was seen by Johnston-Stewart (*Nyala* 3(1), 1977: 89) on Thyolo Mt, 8 July. Neither record is questioned by Dowsett (*Nyala* 7(1), 1981: 39-40) in his review of montane birds in Malawi. The July record does not support the likelihood of any movement.' - Ed.

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References:

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